

EAIP

NOTES FOR REMARKS

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'THE ENVIRONMENTAL CHALLENGE
-- LET'S GET IT RIGHT'

CALGARY DESK AND DERRICK CLUB

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Thanks for that kind introduction, Dianne.

Thanks for the welcome you've given me, Guests and Members of the Desk and Derrick Club.

I feel a special honor in addressing this inaugural meeting for 1991 because I was an admirer of Carl O. Nickle, who had such a long association with these dinners.

Dianne tells me it was in 1951 that he made his first address to the Desk and Derrick Club and that he spoke to you for 32 consecutive Januarys.

All of us who knew him felt a distinct sense of loss in his passing just before Christmas. For me, it's a challenge to follow in his footsteps this January evening.

My plan is to discuss the chief issue facing our industry in the 90s -- which I "say" is the environmental challenge, and which must be done right.

However, in the tradition of Carl Nickle, I'd like to begin with a sketch of the business outlook for our industry this year, as I see it.

We've all been hanging on word from the Persian Gulf, where the events have implications for the world on so many levels. For our industry, it's a gripping reminder that our plans and investment decisions always are hostage to the unpredictables of international events.

Yet looking back over 1990, I think it fair to say that despite the price volatility -- away down before Aug. 2, and away up since then -- the Canadian petroleum industry achieved modest growth over the last 12 months.

The figures aren't all in yet but the CPA staff estimates that exploration and capital spending in our industry in Canada in 1990 was in the range of \$6.4 to \$6.8 billion, which is up 10 to 12 percent over 1989. Within this total there was a modest increase in drilling activity -- something in the range of three to four percent.

In the year ahead, some of the revenues from the current higher prices will be reinvested which will mean higher activity levels. How much higher, we don't know. Prospects

for peace or war or stalemate in the Gulf are anyone's guess and industry budgets reflect that profound uncertainty.

But plans already in place promise an active 1991. These could nudge exploration and capital expenditures in Canada into the range of \$8 to \$8.5 billion, up by more than 20 percent over the past year.

These extra capital expenditures in 1991 will be associated with development of the Caroline gas field and the Lloydminster upgrader here in Western Canada and with the Hibernia project and the Panuke/Cohasset development in the Atlantic off-shore.

Not included in these numbers are expenditures for pipeline construction, which could reach an additional two billion dollars.

The CPA expects this activity by our industry throughout Canada will act as a buffer in the economic slowdown this year.

Here in Alberta, industry activity may actually keep the economy out of recession. The preliminary figures for 1991 suggest a 15-percent increase in just our ongoing business expenditures. Drilling activity in this province could be up 10 percent if plans proceed for improving natural gas transportation.

This could bring total Alberta industry expenditures for '91 to \$6.5 billion, a 30 percent increase over last year.

Of course, there's a qualifier in this rosy picture. If crude oil price drops dramatically, then not all the budgeted funds will be spent. Cash flow continues to be the controlling factor.

And I'd caution you -- the 1991 situation represents an investment spike and not a new base level for industry spending.

In a nut-shell, the 1991 outlook for our industry is encouraging throughout Canada and especially so in Alberta. Our optimism, though, is tempered by our anxiety over the extreme volatility in price.

Yet I remain convinced that the overriding uncertainty for our industry -- this year, next year and the years after that

-- is the environment, not price. And that's what I want to spend the balance of my time on.

We've all heard speeches about the environment, seen the articles and watched the television programs.

They remind me of an article Russell Baker once wrote about computers. He was tired, he said, of being told how computers worked. He said he had no idea, for example, how a light bulb works but that did not stop him from putting high value on what light bulbs could do for him.

I find environmental science much the same. It's a very complex science but the impacts and benefits can flow to us all.

It's natural to fear the uncertain and the unknown. We've done that throughout human history. Overcoming fear of the unknown -- whether disease or distance or the dark -- has been a major challenge to every generation.

Today's unknown, today's dominant uncertainty, is the quality of the air we breathe, the water that sustains us, the soil that feeds us, the waste that must be disposed of.

We wish that humankind had all the answers to these pervasive concerns. Some people claim they already have the answers -- usually, I find, because they have defined the problem in a way which fits the solution they would like to impose on the rest of us.

But real answers don't come that easily. Environmental issues are not only complex but they're frequently elusive as well. They're subject to almost daily redefinition in the light of the pulls and shoves of public opinion, of politics, science, law, and, by no means least, the economic demands we all place on society.

As a result, and notwithstanding our firm intention to address environmental issues responsibly and conscientiously, our priorities and the economic decisions which accompany them remain to be defined.

And I might comment that when there is good environmental news, it tends to get missed. In October, for instance, federal Environment Minister Robert de Cotret issued an encouraging report on the refining industry. He said discharge of contaminants into Canadian waterways by the

petroleum refining industry decreased by more than 80 percent between 1972 and 1987.

That accomplishment didn't seem to make much of a blip in the public arena. But it shows an important part of our industry is heading in the right direction. It tells me we can take pride in our efforts to meet or exceed federal and provincial requirements.

I don't have to tell the Desk and Derrick Club that Canadians benefit dramatically from the production and export of energy. What ought to trouble all of us here, however, is that Canadians are beginning to perceive themselves not as beneficiaries of and stakeholders in their energy industry but rather, as victims of it. That seems to me to be an important point, because of the implications which it holds for the achievement of a national consensus.

There is no doubt that the environmental concerns which trouble Canadians these days are deeply and sincerely held. In the 12 years that the CPA has been tracking public opinion, it has seen these concerns grow and become embedded in the national value system.

What bothers me is that the environmental issue often is exaggerated. It is no overstatement to say it is the issue that the public knows least about and fears the most.

Let me discuss some aspects of global warming to make my point. Many contend global warming is the most important environmental challenge we face.

It is serious. Many scientists forecast significant real trouble if we don't slow the buildup of greenhouse gases in the atmosphere.

It is also serious because politics and emotion are outpacing science.

And it is serious because we scarcely even know the right questions to ask about it to get movement toward rational solutions.

How do we know, for instance, that even our best efforts to curtail greenhouse gases would do any good?

After all, there are many uncertainties and even contradictions about the effect of these gases, of which there are several.

Carbon dioxide is often painted as the chief villain but in reality, carbon emissions follow from many different activities of people and nature. They are part of a complex, and not well understood, cycle of generation and absorption of carbon by plants, soil and bodies of water.

By most estimates, fossil fuel combustion contributes about five billion tonnes of carbon to the atmosphere each year. Deforestation could be responsible for as much as two billion tonnes. But a much larger natural carbon fluxes of about 200 billion tonnes per year are taking place into and out of the atmosphere as a background to this. These natural fluxes appear to be in balance.

What all this means, I suggest, is that a high priority needs to be placed on improving the deficient areas of this science. This will not only help guide potential responses but will give us better assurance that the trillions of dollars that the world might direct toward reducing man-made emissions will achieve the intended effect.

There's talk of carbon taxes to reduce emissions. The question is how a country such as Canada, with such marked variations in availability of nuclear and hydraulic power, such marked variations in climate and such vast distances, could possibly achieve inter-regional equity with any such tax.

And consider the implications for our international trade. Our economy is largely based on the production of energy-intensive commodities used in other countries to support industrial processes. Do we tax our energy-intensive industries, making them less competitive and perhaps closing some of them?

Remember that world demand for the commodity would continue, which means that jobs and production -- and emissions -- could be shifted elsewhere.

Isn't there a better way than shooting ourselves in the foot?

A better alternative, surely, is to seek out energy efficiency improvements -- which industry in this country indeed is doing through such programs as the Canadian Industrial Program for Energy Conservation -- CIPEC for short. CIPEC estimates Canadian industry has become 28

percent more energy efficient since 1973. No one denies a lot more could be done.

We also need to ask how far Canadians really would be willing to go to reduce carbon dioxide emissions.

If we want to stabilize carbon dioxide emissions from fossil fuel combustion by the year 2005, for instance, we could probably do it by improving the fuel efficiency of all cars on the road by 50 percent, which is likely twice the improvement we would expect without drastic intervention. And that change would get us to where the Italians are today -- smaller cars, delivering less power.

We would also have to build four large nuclear power plants to replace 70 percent of the coal-fired electricity generation in Canada. Incidentally, most of Alberta's plants are coal-fired.

Are we really ready for this in the next 14 years?

And if we did it, would it make a significant contribution to resolving the global problem?

The answer is No.

While I don't deny the need for leadership, Canada is a small player when it comes to carbon dioxide emissions from fossil fuel combustion. We contribute about two percent of the world total. In isolation, our actions won't be decisive.

So what can Canada do on its own?

Regrettably, if we act in the absence of an enforceable international accord, our actions will be ineffective at best. And they will be counterproductive if industries simply move operations to other countries to reduce costs.

Consider, too, that some of our resources -- financial, technology and know-how -- might well have more leverage directed outside our borders to help solve the global problem.

So what should we be doing in response to a very real issue? What's the proper role of industry in the policy development process?

I can offer some answers.

At Imperial, we start from the belief that the threat of global warming indeed is a serious issue and that it's critically important to "get it right". That means we need sound public policy to deal with it. It means corporations such as Imperial should be dedicating some of their resources to generating sound data.

We have made seven commitments. Specifically,

- Imperial is developing an inventory of greenhouse gas emissions in its operations and identifying opportunities and determining costs to reduce them.
- We are determining the technical and economic potential for further improvements in energy efficiency, with an eye to reducing carbon dioxide emissions.
- Together with government and the scientific community, we are figuring out how our research capabilities can be used to address the issue.
- Imperial is studying the technical and economic potential for carbon dioxide "sinks" to remove carbon dioxide from the atmosphere.
- We are developing "life-cycle" assessments of greenhouse gas emissions for fossil fuels and their alternatives in various end uses.
- We are assessing the technical and economic potential for fuel switching; and
- We are assessing the macro-economic consequence of legislative options -- such as carbon or fuel taxes -- to reduce carbon dioxide emissions.

You may have noticed that in outlining these actions I used such word as "assessing," "determining," and "developing." You may think these are not the most dynamic verbs you've ever heard.

But we need to "cost out" before we "wipe out."

And we need to "evaluate" before we "eliminate."

We need to walk before we run and we need to supplement emotion with scientific and economic facts.

You don't have to be a rocket scientist to realize that in this milieu of fear and doubt, the future of our industry depends on the understanding and goodwill of the general public. The last Decima opinion survey, for instance, told us that 47 percent blame private industry for most of the country's environmental problems.

Decisions by, for, and about our industry will be made by a broad constituency because Canada, in step with the world, has entered a new era of shared decision-making. Yesterday's political theory about governing only with the consent of the governed is today's reality. The age of kings and industrial czars deciding for the public is past.

Sharing timely and accurate information is essential to the new process. Our industry must be present and play an active, positive and informed role. We must harmonize our activities with environmental requirements. And at the same time, we must be cognizant of investor needs, employee expectations, government policies and regulations, and the needs and demands of consumers.

I believe progress is being made in striking these difficult balances in the private and public arenas.

The federal Green Plan for the environment --announced last month -- naturally hasn't delighted everyone, including some people in our industry. Still, any fair-minded person surely would agree it's headed in the right direction. The very fact the plan was preceded by extensive consultation with the industry -- and with all other interest groups -- signals the acceptance of more informed, more effective consensus-building and decision-making.

We're setting some good examples in Alberta, too, where I represent our industry on the Alberta Round Table on the Environment and the Economy.

I believe in a policy development process in which government sets environmental goals and industry develops the means to achieve them.

I'm convinced this kind of consultative process gives us a chance to build our future, rather than just react to it when it arrives at our doorstep.

It helps government, industry and the public understand the challenges, estimate the costs and define the expected

benefits. And it brings many views and voices to the process of sequencing our environmental challenges.

There are clear signs about the direction in which we should be moving:

- We should act now on matters like conservation and efficiency.
- We should invest heavily in science to understand as fully as possible the physical characteristics of our problems.
- We should invest heavily in education to gain widespread understanding of the issues and choices.
- We should encourage the consensus-building or round-table approach to the maximum practical level. Such an approach encourages partnerships and shared responsibility.
- And, we should focus hard on economic instruments which advance market solutions.

Within the industry, every company needs to have action plans commensurate with its real needs and resources. In Esso Resources, \$35 million has been earmarked for environmental and safety expenditures in 1991. While this figure represents dozens of site-specific initiatives, as a category, this expenditure is one of the largest single capital items in this year's budget.

Environmental considerations are being incorporated into an ever-increasing range of technical, operating and economic decisions.

To us, balancing environmental and economic considerations is the essence of sustainable development in 1991 and beyond.

The challenges are huge, but we should approach them with the same confidence that David displayed when he faced the giant Goliath. Everyone advised David to forget about confronting the enormous giant, saying: "He's so huge, there's no way you can win."

To which David replied, "He's so huge, there's no way I can miss."